### STATE OF QUALITY REPORT: PHASE II

#### **EXECUTIVE SUMMARY**

## 1.0 Introduction

Applied Health Outcomes in collaboration with the TennCare Bureau of the State of Tennessee are pleased to present this State of Quality Report Phase II as part of the Centers of Excellence program. The State of Quality is a two-phase report outlining cost<sup>\*</sup>, utilization and quality in the TennCare program and identifying specific disease states that provide the greatest potential for quality improvement. This report will be provided to the Centers of Excellence Board of Directors for the selection of disease-specific initiatives to be implemented and to program partners for their review.

Phase I of the State of Quality report dealt with the cost and utilization of resources in the TennCare population and identified ten disease states that show potential for quality improvement initiatives. This report represents Phase II of the State of Quality and contains specific quality metrics for the ten identified disease states in detail.

## 2.0 RATIONALE

TennCare experienced a 39% increase in drug expenditures between July 2000 and March 2001. Presently the program pharmaceutical expenditures exceed \$60 million per month. Results from Phase I of the State of Quality Report indicate that the 1.4 million eligible enrollees who were covered under TennCare during July 2000-June 2001, received an average of 25 prescriptions PMPY.

In response to this trend of increasing pharmaceutical costs, TennCare leaders are taking steps to shift from the traditional cost containment methods to strategies that focus on a broader perspective of resource utilization. Such efforts include The Centers of Excellence Program where the intent is to assess and communicate the value of pharmaceuticals, when used appropriately in accordance with evidence-based treatment guidelines.

<sup>\*</sup> Costs were defined as the total amount of dollars charged

## 3.0 STATE OF QUALITY PHASE II

Quality and/or descriptive analysis was conducted on the ten disease states to evaluate the level of health care specific to TennCare utilizing members. Findings on disease prevalence rates, use of medical services and level of quality as compared to nationally recognized benchmarks are presented for each disease. The Board of Directors will review the analysis findings in order to prioritize and select which of the ten disease states will be chosen for a Center of Excellence quality improvement initiative. It is anticipated that at least two to four Centers of Excellence will be initiated in 2002 with others to follow in subsequent years.

#### 4.0 Phase II Analysis Results

The following highlights provide an abbreviated description of the quality analysis results obtained in Phase II for the ten identified disease states. Complete findings are described in detail further in the report.

#### **A**STHMA

➤ On average 57% of TennCare asthmatics receive appropriate medications per HEDIS® recommended guidelines. These numbers are in line with the 1999 State of Managed Care Report, which states that 57.3% of health plan members with persistent asthma, appeared to be receiving appropriate medications.

#### **CORONARY ARTERY DISEASE**

- ➤ Of the patients with two or more diagnosis of CAD, 59% were prescribed an antilipidemic medication leaving 41% of the CAD patients who may require more aggressive treatment.
- ➤ A small percentage, 21% of the HEDIS® CAD population received LDL screenings according to guidelines. This percentage is well below the national and regional LDL screening averages, which range from 64 to 70%.

#### **CONGESTIVE HEART FAILURE**

- Approximately 33% of TennCare CHF population have hypertension, while 22% of the patients have comorbidities of CAD and respiratory illness.
- ➤ With 60% of the CHF patients utilizing ACE inhibitors, there may be a substantial opportunity to increase the use of ACE inhibitors in this population.

# **CHRONIC OBSTRUCTIVE PULMONARY DISEASE**

> The majority of TennCare COPD patients are receiving prescriptions for short- and long-acting β<sub>2</sub>-agonists and/or anticholinergic bronchodilators such as ipratropium,

which according to disease management practices will yield higher success rates. However, the days supply analysis for these agents indicate that 59% of the  $\beta_2$ -agonist prescriptions were for 0 to 30 days. Findings for the severe and non-severe populations show that of  $\beta_2$ -agonist prescriptions dispensed, 48% and 66%, respectively, were for a 30-day supply. These findings suggest that a majority of COPD patients are being managed according to recommended pharmacotherapy agents but may not be managed appropriately with respect to treatment duration.

### **DEPRESSION**

➤ Study findings for the TennCare depressed population indicate a lack of compliance with national benchmarks for Antidepressant Medication Management. For optimal practitioner contacts, 12% of the TennCare HEDIS® sub-population were compliant, versus 21.3% at a national level. For acute phase treatment, 38% of patients received treatment according to recommended guidelines, versus 58.5% of nationwide managed care patients. Continuation phase treatment indicates that 22% of patients received care compliant with guidelines, versus a national average of 42.2%.

#### **DIABETES**

- ➤ TennCare ranked higher in annual retinal exams than both the regional and national averages reported in NCQA's (National Committee for Quality Assurance) 1999 State of Managed Care. Of the 117,895 diabetic patients included in the study, over one-half, or 60,320 were treated for annual retinal exams as recommended.
- ➤ Additional results from TennCare analysis on the HEDIS measure for Comprehensive Diabetes Care indicate that HbA1c tests and LDL screenings were below the regional and national averages.
- In conjunction with another analysis performed on the TennCare hypertensive population, patients having a comorbidity of diabetes were identified to evaluate pharmacotherapy utilization. Angiotensin Converting Enzyme Inhibitors (ACEIs) are considered the agent of choice in hypertensive patients with concomitant diabetes, especially in patients with diabetic nephropathy. Of the patients identified with both DM and hypertension, 46% were found to be on an ACEI or ACEI combo.

#### **HYPERTENSION**

- ➤ Congestive heart failure is another comorbidity for which the use of an ACEI is recommended. If an ACEI cannot be tolerated, it is suggested to initiate treatment with an ARB as an alternative. Of the 22,135 HTN patients with CHF, approximately 49% received an ACEI or ARB during the study period, indicating that 51% of patients may not be on optimal therapy per recommended guidelines.
- Over half of the post-MI hypertensive patients are not currently being treated with a β-blocker, as recommended by the JNC-VI Guidelines

#### PAIN / MUSCULOSKELETAL

➤ Of the medical diagnosis categorized as Chronic Nonmalignant Pain, back pain is diagnosed in 25% of the patients. When combined, back pain, osteoarthritis and other joint disorders contribute 67% of the total TennCare CNP population.

- Narcotic analgesic combination prescriptions contribute nearly one-half of the total prescriptions used in the management of CNP. From that class, acetaminophenhydrocodone is the most commonly prescribed agent.
- ➤ Of the 60,940 TennCare patients being treated for CNP, 70% received adjuvant therapy to complement their existing treatments. Tricyclic antidepressants are most commonly prescribed, 29%, followed by SSRIs and corticosteroids, which represent 28.7% and 28.4%, respectively.

#### **PNEUMONIA**

- ➤ Based on the 2001 ATS guidelines, 11.5% of CAP patients were treated according to recommendations.
- ➤ Macrolides are the most frequently prescribed agent with 24% of the CAP prescriptions dispensed for these agents followed by 1<sup>st</sup> generation cephalosporins and aminopenicilins.

#### **SCHIZOPHRENIA**

- In the schizophrenia population included in the study, the largest percentage of pharmaceutical utilization, 72%, is in atypical antipsychotics. Olanzapine exhibited the highest atypical use with 27% of prescriptions written for this agent.
- ➤ The HEDIS Follow-up for Mental Illness measure for the TennCare HEDIS® subpopulation shows 55% of schizophrenia patients had a follow-up visit with a mental health provider within 30 days of hospital discharge versus a national average of 70.1% among commercial managed care plans.